

ABSTRACT OF THE DISCLOSURE

A technique for providing user domain constrained optical route flooding for multiple optical networking service modes is disclosed. In one embodiment, the

5 technique is realized by a method for routing information over an optical network having multiple optical service models. The method comprises receiving a link state advertisement including an incoming optical interface descriptor at an optical switch, checking an outgoing

10 optical interface descriptor for an outgoing link; flooding the link state advertisement over the outgoing link if the outgoing optical interface descriptor has a first pre-defined value, blocking the link state advertisement if the outgoing optical interface descriptor has a second pre-

15 defined value, and comparing the ingoing and outgoing optical interface descriptors if the outgoing optical interface descriptor has neither the first pre-defined value nor the second predefined value and flooding the link state advertisement only if the incoming user group identifier

20 matches the outgoing optical interface descriptor.